

Dues

According to club records, the dues of the following members are overdue more than three months.

Tom Distler
John Fisher
Jim Lynch
Kevin Schumaker

Per the bylaws, you will be removed from active status until all dues in arrears are paid. This is the last issue of the newsletter you will receive. If there is an error in the club records, please contact one of the officers.

September Meeting Minutes

The proposed bylaws as submitted to the members in an August mailing were voted upon, and unanimously accepted.

Dues payments of \$10 were accepted at the meeting from members whose dues were payable before the end of the year. From now on, dues will be \$15 in accordance with the bylaws.

A sign-up sheet was provided for anyone wishing to share a ride to Ataricon, the convention sponsored by MACE in late October. Anyone interested who was not at the meeting should contact Mike Seavey.

Don Kramer, the cassette librarian, and Ed Wanat, the disk librarian, said that anyone having submissions for the club library should get the disk or tape to them by any possible means. The disk or tape would be returned at the next meeting or earlier, if possible. Don has developed a program to catalog the cassettes. Ed is in the process of cataloging our somewhat disorganized disks. He estimates that there are currently 200 to 300 programs in the library.

Mike Seavey announced a membership drive. Letters have been sent to all local retailers who handle Atari products, and they have all been put on the newsletter mailing list. Mike asked if anyone would be interested in the job of publicity chairman. The duties would consist mainly of seeing that a notice is put in the Courier before each meeting. There were no volunteers. If you're interested in the job, give Mike a call.

Don Kramer mentioned that the Team Electronics store at Crossroads Shopping Center will continue to carry Atari products. They are no longer available at the main store on University Avenue.

Stan Ernster demonstrated another homemade Atari case. His other one became obsolete when he

upgraded to an 800 thanks to Target's closeout prices (\$299 minus a \$100 rebate).

Tom Wanat demonstrated POO-YAN, ZAXXON, ZEPPELIN, and STAR RAIDERS.

Chuck Hill demonstrated an enhanced Atari DOS he picked up at the HawkAtari meeting. The DUP.SYS portion has several nice features added, including hex/decimal conversion and a drive speed check.

- JMC

October Meeting Program

For part of this month's program, we are going to try something new. We are going to try to provide help and/or instruction in various areas. This month, we are going to start with a presentation for beginning beginners to the Atari computer system and a presentation for beginning assembly language programmers. Mike Seavey, assisted by John Corley, will be making this presentation. Stan Ernster will be presenting the beginning beginners program. Mike's presentation is intended for the advanced beginner and intermediate programmers. No special materials are required. Stan's presentation is intended for new owners unfamiliar with the Atari computer or computers in general. It is highly recommended that those interested in this program bring their systems with them so that they can get hands on experience during the presentation. Also bring extra drop cords. If this type of program is of interest, others possible topics might include an introduction to other programming languages, getting the most out of your cassette or disc drive, or any other topics of interest. The idea is to help our members to expand their knowledge of their computer and assist them with problems they might be having. Since these programs will be tying up two systems, if anyone can bring any extra equipment, particularly disc drives, it would be greatly appreciated.

Stan Ernster - V.P.

BLACKHAWK ACE HEADER BYTES - OCT 83 by Mike Seavey

Our meeting minutes were written up by John Corley this month so this article will less business and more software.

Our October meeting will be held Sunday the 23rd starting at 2:30PM at the Waterloo Recreation Center, 225 Cedar Street. Officers will hold a short meeting at 2:00. The Analog 13 disk has still not arrived.

Hardware Volunteers for our October 1983

meeting are listed below :

NAME	ITEM
Steve Hansen	TV
Stan Ernster	800, 410, 850, TV
Ed Wanat	800, 810
Don Kraner	400, 410
Kevin Hazen	800, 810, TV
Alan Aukes	800, 810, possibly 850 with Gemini 10X

We could use 3 more Disk drives. If you would like to help call me at 235-9292 after 5:00PM or just bring whatever you can.

Hardware volunteers are encouraged to arrive at 2:20PM to allow 10 minutes system setup time.

Agenda for our October meeting:

TIME	ACTIVITY	SYSTEM
2:30-2:45	Business meeting	All off
2:45-3:30	Game Demos	1
" "	Beginning Basic	2+others
" "	Beginning Assembly	3
" "	Open system	4
3:30-4:00	Library submissions	1 & 2
" "	Library copying	3 & 4
" "	Library check in/out	none
4:00-5:00	Open time	??

Catch the Input-Output Bus
(bits and bytes since our September meeting)

Penny's is selling ATARI 800s for \$299.00. Buy before October 31 and mail in your rebate request within 30 days and your net price will be about \$211.00. (no rebate on the sales tax)

World Radio was selling 810 disk drives for \$340.00, but you guessed it, they are all out.

We had only 3 people interested in arranging a group trip to the MACE ATARI convention. If you are going please contact me as soon as possible.

More on Uses for the Atari
Editor-Assembler Cartridge

See last months Blackhawk ACE newsletter, (SEPT 83, although it says AUGUST 83) on how to make Basic EXEC files. Here is one I made which will dump Graphics 0 screens to a printer. (or the screen if you POKE 82,0, POKE 83,39, and substitute PRINT for LPRINT). I started with the following code, which is presently set up only for noninverse alphanumeric characters:

```
1 CLR :S=PEEK(88)+PEEK(89)*256:DIM C$(999):FOR L=1
```

```
TO 960:C$(L,L)=CHR$(32+PEEK(S+L-1)):NEXT L:LPRINT  
CHR$(14);C$
```

Last months EXEC technique plus the translation idea hinted at generated the same program less line numbers :

```
CLR:S=PEEK(88)+PEEK(89)*256:DIM C$(999):F.L=1 TO  
960:C$(L,L)=CHR$(32+PEEK(S+L-1)):N.L:LP.CHR$(14);C$
```

The above EXEC resulted from the idea of EDITOR-ASSEMBLER replace commands as the basis for automatic translation. After being turned into an EXEC the following was done :

- 1) ASM-EDITOR cart installed
- 2) ENTER any LISTED ATARI Basic program
- 3) ENTER the ASM/ED EXEC program listed below as follows:

```
ENTER #D:MASHLST.EXC,M
```

- 4) LIST the resulting mashed ATARI Basic program back to disk.

```
LIST #D:GR0DUMP.MSH
```

ATARI Bulletin Board System Operators take note! This procedure will reduce the disk space and download/upload times of these files by 5 to 15 percent! If you have two double density drives this could mean in the range of 54K savings, or over 1/2 the capacity of an 810 drive. Note that every ATARI computer out there will automatically re-expand the program to normal size with minimum permanent effects. MASHLIST.EXC, an ED/ASM EXEC file to reduce disk space of LISTED ATARI Basic files follows:

```
REP /GRAPHICS /GR./,A  
REP /SETCOLOR /SE./,A  
REP /PLOT /PL./,A  
REP /COLOR /C./,A  
REP /PRINT /PR./  
REP /POINT /P./,A  
REP /SAVE /S./,A  
REP /DATA /DA./,A  
REP /XIO /X./,A  
REP /STATUS /ST./,A  
REP /LOAD /LO./,A  
REP /LPRINT /LP./,A  
REP /NOTE /NO./,A  
REP /OPEN /O./,A  
REP /INPUT /I./,A  
REP /CLOSE /CL./,A  
REP /ENTER /E./,A
```

```

REP /CSAVE /CS./,A
REP /R&M /./,A
REP /POSITION /POS./,A
REP /DRAWTO /DR./,A
REP /LOCATE /LOC./,A
REP /SOUND /SO./,A
REP /TRAP /T./,A
REP /RESTORE /RES./,A
REP /GOSUB /GOS./,A
REP /RETURN /RET./,A
REP /GOTO /G./,A
REP /FOR /F./,A
REP /NEXT /N./,A
REP /LIST /L./,A
REP /BYE /B./,A
REP /LET //,A
REP /LET //,A
REP / = /=/,A
REP / = /=/,A

```

I used the above on a downloaded program, TITAN, and reduced it from 112 to 97 disk sectors. Reference the ASSEMBLER EDITOR USER'S MANUAL pages 17 and 21 for more details or give me a call at 319-235-9292 after 5:00PM.

(Editor's Note: The following article was downloaded from SIG-ATARI on Compuserve)

RANA REVIEW

by Richard Brudzynski

Well, I've owned a Rana for approximately 36 hours - enough time to get some initial impressions. My first impression was one of surprise - the drive inside the box differs substantially from the one pictured in the advertisements. In fact, it doesn't resemble the one depicted on the box and does not perform some of the functions promised on the box! If you check the ad on p.20-21 of September's Compute you'll see what I mean. On page 20 the drive is depicted as having a flip open side action lever - the same is depicted on the box. There is no such lever on the real Rana. The drive door opens and closes with the standard pull-down, push-in type mechanism.

Examination of the front-panel in the advertisement (and more clearly, on the box) discloses the presence of buttons. There are NO such buttons on the Rana. Instead, there is a pressure-sensitive strip which you must press in the "right" spot to activate the given function. That "right" spot can be tricky to find.

Press the left side of the switch to activate the "protect", "track", and "error" functions and the center for "density" and "unit number". The

strip takes some practice to use effectively and you can easily push the light drive across the table top when trying to use one of the function keys. Since your finger must remain continuously on the strip to activate a function (except "protect"), your drive can go sliding along the table while you push futilely on the "wrong" part of your "button". The best operational hint is to use your right hand (so as not to obscure the display), press on the top with your fingers, and use your thumb to activate the proper segment of the function button.

The advertisement refers repeatedly to "beeping" buttons. If you were expecting to receive audible confirmation that a function has been activated - forget it. This drive definitely does not beep.

An overhanging panel above the LED obscures the display unless the drive is at eye level or far enough away from the user to be visible. A button must be continuously pressed to activate the display. It will not register the fact that an error is occurring. If you keep your finger on the button or activate the function after an error has occurred, the LED will report the last error which occurred.

My initial impression of the human engineering of the Rana and the integrity of the advertising is not favorable.

OPERATION: The drive is whisper quiet in use - it takes some getting used to after the clunking and banging of the 810. I don't notice a difference in speed, but since the death of my 810 I have nothing to measure it against. Formatting a disk with Atari DOS takes a hair under 41 seconds.

NO LOADS: Software from Broderbund will not load on it, one is instead treated to a series of hitherto unrecoverable messages from the programmer about the evils of piracy! Everything else I have tried so far loads, but I am fearful of what my next software purchase will bring.

DOUBLE DENSITY: Nothing to say about this right now. The DD chip is not in it and I am told that as soon as it becomes available, it will be installed free of charge. More later.

ERROR MESSAGES: The error message system is VERY thorough - the drive will diagnose more disk errors, hardware errors, etc. than you can experience in a lifetime! I ran a number of disks from my Elephant's graveyard through and the diagnosis seemed worthwhile.

DOCUMENTATION: The documentation supplied was quite thorough, set-up was uncomplicated. The error codes are explained and there are suggested actions for remedying problems.

GENERAL IMPRESSION: If you don't NEED a disk drive now, I'd recommend waiting. At the very least the disparity between the drive advertised and the

drive provided suggests that Rana has not got its act together yet. If they are not being entirely square with us about the external features and functions of the drive, then we should be cautious about other promises such as "double density" operation. Hang on until Rana delivers what it's promised!

Lister Assister Modifications by Stan Ernster

In the July, 1983 issue of ANTIC, an interesting program for creating a structured format for programs appeared under the title of Lister Assister. Some of the features of this program were: 1. right justified numbering of lines, 2. uniform left justification of all text one space to the right of the line number, 3. plain english listing of control codes, 4. automatic paging and numbering, 5. titling of each page and source documentation for the listing. The major disappointment for me was the limitation to use with an Epson printer and the need for using a disk drive to create the listing. Modifications for the Atari 825 printer and cassette were necessary to be useful to me.

The first change was to add use of cassettes in place of disks. An addition to line 660 to check for the C: device and skip the disk file name procedure was made (listings at end of article). The next problem arose when three times at the same point in the occurring. This problem was addressed in the August issue of ANTIC. My solution was somewhat different. The addition of line 192 and the modification of line 200 fixed the problem. The program was checking beyond the length of the string. Adding the variable QZ and setting it equal to the length of the string when the program wanted to check further seemed to clear up the problem nicely.

Changing the control codes for normal and condensed print was fairly easy. The following lines must be changed by inserting the appropriate codes for your printer:

100,140,295,365,510,700,710

Presently when listing from cassette the program name is printed as "C". An interesting modification that someone might like to try would be to print the actual program name rather than just "C" in the documentation.

LINE LISTINGS

```
660 ? :? :? " ENTER FILE NAME:";INPUT F$:IF
F$="C" THEN D$=" ":D$(20)=D$:D$(2)=D$:GOTO 670
192 QZ=N+4:IF QZ>LEN(A$) THEN QZ=LEN(A$)
200 IF A$(N+1,QZ)<>R$ THEN RF=1
```

Cassette Library System by Don Kramer

When I first had the idea for this program, I wanted to use the computer to keep track of the records for the tape library. What I ended up with is listing #1. This program, on a 16K system, will handle the checking in and out of tapes and associated data for at least 50 tapes. To do this the program had to be simple and it was necessary to not use any REM statements. Listing #2 could have been added to this program but that would have reduced the number of tapes that could be handled in 16K.

Listing #1 uses the forced read mode described in "Using The Atari Forced Read Mode" by Frank C. Jones in Compute's Second Book of Atari to edit a line of data in the check in routine. This same technique is used in the check out routine. The program stores the names for the last three people to check out a given tape. If less than three people have checked out a given tape then the name and date are just added to the bottom of the list; otherwise the first name and dates are removed from the list before adding the new name and date to the bottom of the list. The data about each tape is stored in blocks of data lines, and the data in each block is always laid out the same way. This way it is possible to find the data block about a given tape without reading the entire data list. It is only necessary to read the first data element in the block, which is a cassette identification number.

Listing #2 sets up blocks of data about new tapes as they are added to the library by writing the first and last data lines for the block. To run either program simply load the desired program and use an 'enter' command to load the data, which is stored separately. You will be prompted for any input needed. If a cassette identification number that doesn't exist is input then you will be asked for another number. If an incorrect but existing number is input then the wrong data will be displayed, so be sure to check if the correct cassette identification number is displayed on the first line of the screen.

The ANALOG #8 cassette is missing. Please check to see if you have it, and if you do, return it to Don Kramer, the cassette librarian, as soon as possible.


```

99 REM **** LISTING 1 ****
100 DIM CIDN$(5),DISC$(50),NAME$(20),DOUT$(7),DIN$(7),TAPE$(
5),DATE$(7),URN$(20):DLN=10000:MENU=150:TRAP 2010
150 ? ")":POSITION 7,9:? "PRESS / TO CHECK IN TAPE.":POSITIO
N 7,12:? "PRESS 7 TO CHECK OUT TAPE."
152 POSITION 7,15:? "PRESS t TO SAVE DATA."
160 OPT=PEEK(764)
170 IF OPT=13 THEN 200
180 IF OPT=8 THEN 400
190 IF OPT=62 THEN 800
195 GOTO 160
200 GOSUB 2000
210 LIN=DLN+10:RESTORE LIN
220 READ NAME$,DOUT$,DIN$
225 IF NAME$="EDB" THEN DLN=10000:RESTORE DLN:GOTO 200
230 IF DIN$("<")"*****" THEN LIN=LIN+10:GOTO 220
240 ? ")":POSITION 5,3:? CIDN$:POSITION 3,5:? NAME$:POSITION
28,5:? DOUT$
250 ? :? :? "WHAT IS TODAY'S DATE(25DEC80=DECEMBER 25,1980)?
":INPUT DATE$
260 ? ")":POKE 559,0:? :? :? LIN;" DATA ";NAME$;",";DOUT$;","
;DATE$:? "CONT"
270 POSITION PEEK(82),0:POKE 842,13:STOP
280 POKE 842,12:DLN=10000:RESTORE DLN:POKE 559,46:GOTO MENU
400 GOSUB 2000
410 READ DISC$
420 ? ")":POSITION 6,1:? CIDN$:POSITION 3,3:? DISC$
430 POSITION 2,7:? "NAME":POSITION 24,7:? "OUT":POSITION 32,
7:? "IN":W=1
440 READ NAME$
450 IF NAME$="EDB" THEN 490
460 READ DOUT$,DIN$
470 POSITION 2,7+W:? NAME$:POSITION 24,7+W:? DOUT$:POSITION
32,7+W:? DIN$
480 W=W+1:GOTO 440
490 ? :? "WHAT IS YOUR NAME?":INPUT URN$
500 ? :? "WHAT IS TODAY'S DATE(25DEC80=DECEMBER 25,1980)?":I
NPUT DATE$
510 ? ")":POKE 559,0
520 IF W<4 THEN ? :? :? DLN+(W*10);" DATA ";URN$;",";DATE$;
","*****"? "CONT":GOTO 590
530 RESTORE DLN+20:LIN=DLN+10
540 FOR I=1 TO 2:READ NAME$,DOUT$,DIN$
550 ? :? :? LIN;" DATA ";NAME$;",";DOUT$;",";DIN$
560 LIN=LIN+10:NEXT I
570 ? DLN+30;" DATA ";URN$;",";DATE$;","*****"
580 ? "CONT"
590 POSITION PEEK(82),0:POKE 842,13:STOP
600 POKE 842,12:DLN=10000:RESTORE DLN:POKE 559,46:GOTO MENU
800 ? ")":POSITION 4,8:? "PREPARE CASSETTE TO ACCEPT DATA.":
POSITION 9,10:? "PRESS SPACE WHEN READY."
810 KEY=PEEK(764)
820 IF KEY("<")33 THEN 810
830 POSITION 14,14:? "SAVING DATA...":FOR WAIT=1 TO 300:NEXT
WAIT
840 LIST "C:",10000,30000
850 POSITION 16,16:? "ALL DONE!"
860 END
2000 FOR WAIT=1 TO 100:NEXT WAIT:POKE 764,255
2010 ? ")":POSITION 12,11:? "WHAT TAPE NUMBER?"
2020 INPUT TAPE$
2025 IF PEEK(195)=6 THEN POKE 195,255:DLN=10000:RESTORE DLN
2030 READ CIDN$
2040 IF TAPE$("<")CIDN$ THEN DLN=DLN+50:RESTORE DLN:GOTO 2030
2050 RETURN

```

```

99 REM **** LISTING 2 ****

```

```

100 DIM CIDN$(5),DISC$(50),N$(3),ANS$(1)
120 ? ")":? :? "WITH THIS TAPE, HOW MANY TAPES ARE IN THE LI
BRUARY?":INPUT N
130 ? :? :? "WHAT IS A BRIEF DISCRPTION(50 CHARAC-TERS MAXI
MUM) OF WHAT IS ON THIS TAPE?":INPUT DISC$
150 IF N<10 THEN CIDN$="#T00":GOTO 180
160 IF N=10 AND N<100 THEN CIDN$="#T0":GOTO 180
170 IF N=100 AND N<1000 THEN CIDN$="#T"
180 N$=STR$(N)
190 CIDN$(LEN(CIDN$)+1)=N$
200 LIN=9950+(50*N):POKE 559,0
210 ? ")":? :? :? LIN;" DATA ";CIDN$;",";DISC$
220 ? :? LIN+49;" DATA EDB"
225 ? :? "CONT"
230 POSITION PEEK(82),0:POKE 842,13:STOP
240 POKE 842,12:POKE 559,46
250 ? :? "THE CASSETTE IDENTIFICATION NUMBER FOR THIS TAPE I
S....":CIDN$
260 ? :? :? "ARE THERE ANY MORE TAPES TO BE ADDED TO THE LI
BRUARY(Y,N)";
270 INPUT ANS$
280 IF ANS$="Y" THEN 120
300 ? ")":POSITION 4,8:? "PREPARE CASSETTE TO ACCEPT DATA.":
POSITION 9,10:? "PRESS SPACE WHEN READY."
310 KEY=PEEK(764)
320 IF KEY("<")33 THEN 310
330 POSITION 14,14:? "SAVING DATA...":FOR WAIT=1 TO 300:NEXT
WAIT
340 LIST "C:",10000,30000
350 POSITION 16,16:? "ALL DONE!"
360 END

```

PEOPLE'S HARDWARE

320 LaPorte Rd., Waterloo
 OPEN SUNDAYS 10 a.m. - 4 p.m.
 ph. 234-6813



Return this ad before November 30,
 1983, and receive \$5.00 off on any
 software in stock.

*** ATARI ***
 SOFTWARE & HARDWARE
 AT DISCOUNT PRICES
 LARGE SELECTION

Blackhawk A.C.E.
 c/o John Corley
 204 Cedar Crest Dr.
 Cedar Falls, IA 50613

PUBLICATION POLICY

The Blackhawk Atari Computer Enthusiasts Newsletter will be published once each month except August and December. It is distributed to members and to other Atari users groups who provide copies of their newsletter.

Members may place three line adds (150 characters) of a noncommercial nature free of charge. Commercial advertisements will be accepted at the rate of \$10.00 per issue for half column adds or three issues for \$25.00, and \$20.00 per issue for full column or half page adds or three issues for \$50.00. Send camera ready copy and check to Blackhawk ACE, 204 Cedar Crest Dr., Cedar Falls, Ia. 50613. Checks should be made payable to Doug Weaver.

Blackhawk Atari Computer Enthusiasts officers

PRESIDENT-----	Mike Seavey	235 9292
VICE PRESIDENT-----	Stan Ernster	233 2571
SECRETARY-----	Mitch Haas	
TREASURER-----	Doug Weaver	635 2296
EDITOR-----	John Corley	277 6817
DISK LIBRARIAN-----	Ed Wanat	234 6813
CASSETTE LIBRARIAN-----	Don Kramer	232 4881

Annual dues are \$15.00. Membership includes a subscription to the newsletter and access to the club library.

Meetings are held the fourth Sunday of each month, except August and December, at 2:30 P.M. at the Waterloo Recreation Center.

This group is not in any way affiliated with the Atari Company.